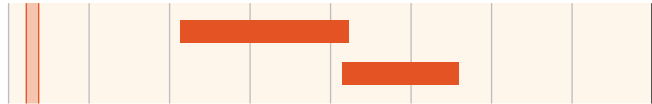
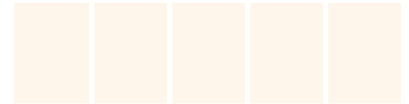


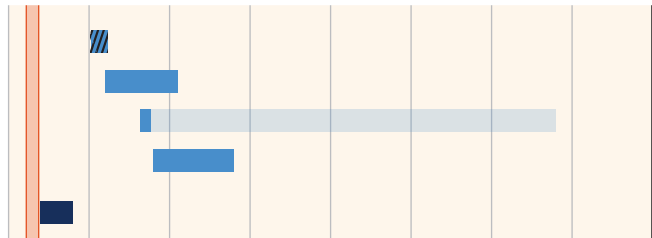
**Scenarios Reaching 450 ppm CO<sub>2</sub>eq in 2100 in Integrated Models**



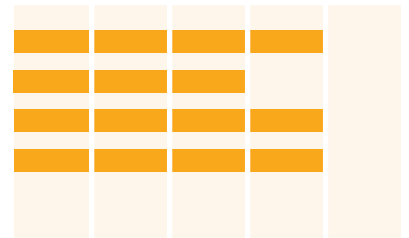
Global Average, 2030  
Global Average, 2050



**Currently Commercially Available Technologies**



Best Practice Energy Intensity  
Best Practice Clinker Substitution  
Improvements in Non-Electric Fuel Mix  
Best Practice Energy Intensity and Clinker Substitution Combined  
Decarbonization of Electricity Supply



**Technologies in Pre-Commercial Stage**



CCS  
CCS and Fully Decarbonized Electricity Supply Combined



0.8 0.7 0.6 0.5 0.4 0.3 0.2 0.1 0.0  
Global Average (2010)

<0 0-20 20-50 50-150 >150

Emission Intensity [tCO<sub>2</sub>/t Cement]

Indicative Cost of Conserved Carbon [USD<sub>2010</sub>/tCO<sub>2</sub>]

Data from Integrated Models	Measure Affects Direct Emissions	Measure Affects Direct and Indirect Emissions
Effect from Increased Use of Biomass as Non-Electric Fuel*	Measure Affects Indirect Emissions	

\* Assuming for Simplicity that Biomass Burning is Carbon Neutral